

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (currently amended): A compound that bindsing to leukocytes, wherein said compound is represented by the formula (1):



(wherein, in the formula (1), Z represents a protecting group for an amino group; Y represents Met or Nle; in $(X)_n$, X represents a spacer consisting of one or more of amino acids and/or synthetic organic compounds, and n represents 1 or 0; in $(\text{NH}_2)_m$, NH_2 represents an amide group as a protecting group for a carboxyl group in the α position of Lys, and m represents 1 or 0; in $\epsilon\text{(-R-(T))}_1\text{-U}$, R represents Ser or Thr binding to an ϵ -amino group of Lys through an amide bond, T represents a spacer consisting of one or more of amino acids and/or synthetic organic compounds, 1 represents 1 or 0, and U represents a group which can be labeled with a metal; with the proviso that said X and T may be the same or different from each other).

2. (currently amended): The compound ~~binding to leukocytes~~ according to claim 1, wherein U in the formula (1) is a group consisting of a peptide represented by -Cys-A1-A2 (A1 and A2 are each an amino acid except for Cys and Pro), nitrogen-containing cyclic compounds with 8 to 20 carbon atoms, nitrogen-containing cyclic carboxylic acid compounds with 8 to 20

carbon atoms, derivatives of nitrogen-containing cyclic carboxylic acid compounds with 8 to 20 carbon atoms or alkylenamine carboxylic acids with 4 to 10 carbon atoms, which can be labeled with a metal.

3. canceled

4. (currently amended): The compound ~~binding to leukocytes~~ according to claim 1, wherein said compound represented by the formula (1) is one selected from the group consisting of:

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-Cys-Gly-Asn);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-Cys-Asp-Asp);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-Cys-Gly-Asp);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-1,4,8,11-tetraazacyclotetradecane-1,4,8,11-tetraacetic acid);

formyl-Nle-Leu-Phe-Lys(NH₂)-ε-(-Ser-D-Ser-Asn-D-Arg-Cys-Asp-Asp);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-diethylenetriamine pentaacetic acid);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-1,4,8,11-tetraazacyclotetradecane-butyric acid);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-1,4,8,11-tetraazacyclotetradecane-butyric acid);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Ser-Asn-1,4,8,11-tetraazacyclotetradecane-butyric acid);

acetyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp);

carbamyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp); and

methyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp).

5. (currently amended): ~~A medicinal composition containing said~~ The compound
~~binding to leukocytes according to claim 1 in labeled state with a radioactive metal or a~~
~~paramagnetic metal as the active ingredient.~~

6. (currently amended): ~~The compound~~ medicinal composition according to claim 5,
wherein said radioactive metal is Tc-99m, In-111, Ga-67, CU-64 or Ga-68.

7. (currently amended): ~~The medicinal composition according to claim 6, wherein~~
~~said composition is used in SPECT or PET image diagnosis~~ A method for imaging a site of
vigorous leukocytes infiltration accompanied by immune reaction in an individual, said method
comprising administering to an individual an effective amount of the compound according to
claim 6 and conducting SPECT or PET imaging on the individual.

8-9. Canceled

10. (currently amended): ~~The compound~~ medicinal composition according to claim 5,
wherein said paramagnetic metal is Gd, Fe, Mn or Cu.

11. (currently amended): ~~The medicinal composition according to claim 10, wherein~~
~~said composition is used in MRI image diagnosis~~ A method for imaging a site of vigorous
leukocytes infiltration accompanied by immune reaction in an individual, said method

comprising administering to said individual an effective amount of the compound according to claim 10 and conducting MRI imaging on the individual.

12. (currently amended): The ~~compound~~~~medicinal composition~~ according to claim 5, wherein said radioactive metal is Y-90, Sn-117m, Sm-153, Re-186 or Re-188.

13. (currently amended): A method of radiotherapy, comprising administering to a patient in need of therapy an effective amount of the compound ~~The medicinal composition~~ according to claim 12, ~~wherein said composition is used for the radiotherapy.~~

14. (currently amended): The compound ~~binding to leukocytes~~ according to claim 2, wherein said compound represented by the formula (1) is one selected from the group consisting of:

- formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-Cys-Gly-Asn);
- formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-Cys-Asp-Asp);
- formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-Cys-Gly-Asp);
- formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp);
- formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-1,4,8,11-tetraazacyclotetradecane-1,4,8,11-tetraacetic acid);
- formyl-Nle-Leu-Phe-Lys(NH₂)-ε-(-Ser-D-Ser-Asn-D-Arg-Cys-Asp-Asp);
- formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-diethylenetriamine pentaacetic acid);
- formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-1,4,8,11-tetraazacyclotetradecane-butyric acid);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-1,4,8,11-tetraazacyclotetradecane-butyric acid);

formyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Ser-Asn-1,4,8,11-tetraazacyclotetradecane-butyric acid);

acetyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp);

carbamyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp); and

methyl-Nle-Leu-Phe-Nle-Tyr-Lys(NH₂)-ε-(-Ser-D-Arg-Asp-Cys-Asp-Asp).

15. (new): A composition comprising the compound of any one of claims 5, 6, 10, or 12, and a pharmaceutically acceptable carrier.